

## **Historic, Archive Document**

Do not assume content reflects current scientific knowledge, policies, or practices.



UNITED STATES DEPARTMENT OF AGRICULTURE  
Agricultural Marketing Service

-----  
THE WHY AND HOW OF APPLE GRADES  
-----

By W. G. Meal, Principal Marketing Specialist

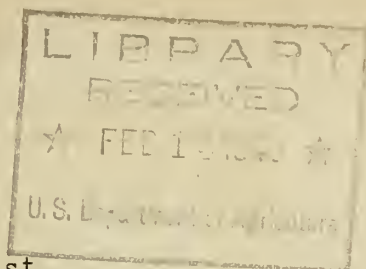
Address, Massachusetts Fruit Growers' Association and American Pomological Society, Worcester, Mass., January 4, 1940

Most of us here today are inclined to take for granted the standardization and inspection of apples. That is natural in view of the growth of this work. During the fiscal year ended June 30, 1939, for example, almost 47,000 carloads were inspected and certified by licensed inspectors at shipping points, out of a total volume of more than 456,000 carloads of fruits and vegetables that were inspected last year. About 1,600 carloads were inspected at terminal markets. For the most part, these inspections were made in response to voluntary requests from members of the industry.

But prior to 1917 no single apple grade was recognized throughout the country. In heavy producing sections grades were frequently discussed, but the grades that were favored generally represented an impractical ideal. At harvest time they were "interpreted" to include anything which was estimated to be "a good commercial delivery."

Local pride and jealousies did much to retard true standardization. Many communities and organizations wanted distinctive brands and strictly local standards. For example, in the Rocky Mountains and the Pacific Northwest more than 20 separate valleys and districts shipped boxed apples. A dozen or more varieties were grown in each. Usually 3 grades or qualities of each variety were shipped. And from 5 to 50 organizations operated competitively in each district. Each organization had its own brands and often its special grade specifications. In the East the problem was complicated further by the large number of varieties that were produced in the older growing sections and packed in the orchard according to individual ideas of grading.

The possibility of setting up standards on a Nation-wide scale was openly doubted. Even the desirability of uniform standards was frequently challenged. The transition of standardization in the apple industry from a local viewpoint to a national viewpoint received great impetus in recent years. This has grown out of the difficulty of selling advantageously the larger supplies of many fruits our orchards and citrus groves are now producing. The "Number One problem" in many sections throughout the country is the distribution of these commodities at prices growers consider necessary to cover their costs. Therefore, in meeting the increasing competition from citrus fruits in domestic markets, and higher quality requirements in export, apple growers are paying more attention to standards of quality. This should be the case as no one but the grower is concerned with grading a crop in such a manner as to obtain the largest return from his capital and labor for the year.



### Permissive Federal Standards for Apples

In discussing apple grades from a national viewpoint, I wish to mention first the work done by the Federal Government. As many of you know, the United States Department of Agriculture has been promulgating grades and standards for apples and other fruits and vegetables since 1918. The standardization work of the Federal Department dates back to 1913 when the Agricultural Appropriation Act for the fiscal year 1914 provided funds for investigations in the marketing of farm products. The Office of Markets, which was established at that time to conduct the work, started investigations with a view to issuing standards. In 1917 the Appropriation Act provided for the establishment of a terminal market inspection service, and in 1922 authorization and funds were provided by the Congress to extend the inspection service to the shipping areas. Succeeding annual Appropriation Acts have included similar provisions for maintaining these standardization and inspection activities.

The use of the grade standards issued by the Department under these statutes is entirely voluntary so far as the Federal Government is concerned. The Federal grades for apples, therefore, are not mandatory, and the Department has not made their use compulsory in domestic commerce. As we shall see later, a number of States have adopted these Federal grades as State grades and, through standardization laws, have made their use at least semi-compulsory.

The Federal laws do not require any statement as to the grade or quality of apples moving in domestic commerce. The use of grade marks and brands denoting size or quality, however, is limited by the misbranding provisions of the Federal Food, Drugs, and Cosmetics Act and the Perishable Agricultural Commodities Act.

The Provisions of these laws merely mean that the apples in packages moving in interstate commerce must agree with the markings on the outside of the containers. It is up to growers and shippers who grade and pack the fruit for such shipment to familiarize themselves with the requirements of the grades or quality statements marked on the packages and to use the care needed to make certain that the markings correctly represent the fruit inside.

### The Export Apple and Pear Act

The only Federal legislation that makes mandatory the grading and inspection of apples is the Export Apple and Pear Act which provides that these fruits may not move into export channels without a certificate of grade resulting from an official inspection. The act has been in effect since 1933 and its operations are understood generally by those interested in the export trade.

The law authorizes the Secretary of Agriculture to prescribe the minimum requirements for apples and pears that may be exported. At present the regulations establish the U. S. Utility grade as representing these minimum quality requirements. We have every reason to believe that the act



is effective in preventing the shipment of low-grade apples to foreign markets and has been helpful in improving the demand for American apples, although the total quantities that may be shipped are limited in various ways by the import restrictions of foreign nations.

Apples cannot be certified for export unless they are found to be free from objectionable spray residues, but this is a matter for which another branch of the Department must assume primary responsibility.

#### State Legislation Pertaining to the Standardization and Grading of Apples 1/

More State legislation has been passed governing the grading and standardization of apples than for any other fruit or vegetable. Sixteen States have enacted special standardization laws affecting apples only. Similar legislation affecting apple standardization has been enacted in all other important producing States through the provisions of general standardization laws affecting farm products or fruits and vegetables in general.

Although the laws of the various States differ in certain respects, the powers granted either in special laws or in general standardization laws are similar. In general they include provisions giving requirements for various grades of apples or they empower some State officer, Department, Board of Agriculture, or other authority to promulgate standards for apples.

Generally speaking, the laws or regulations issued thereunder require apples to be graded in accordance with established standards and practically all of them require certain compulsory marking of containers. Certain penalties are provided for violation of the provisions of the acts.

#### Authority to Establish Standards for Apples

Of the 16 States that have enacted special apple-grading legislation, the laws of Maine, Maryland, Montana, and New Hampshire, specify requirements for State grades, although all except Montana make provisions also for the use of United States standards. In 1923, Maryland, by a special resolution of the Board of Agriculture, adopted the United States standards as official for the State. In 1939, Washington enacted a law directing the Director of Agriculture to adopt and define grades for Extra Fancy, Fancy, C Grade, culls and infested apples.

---

1/ The following discussions of the provisions of State legislation pertaining to the standardization of apples is based on our interpretation of such provisions. Ambiguous wording and complexity of legal phrasing often leave doubt as to the meaning of certain provisions. Then, although we endeavor to keep our files of State legislation up to date, it is possible that some recent legislation has been enacted which has not yet been brought to our attention.

The apple law of Delaware specifies the provisions of United States grades as they were in effect in 1929 but apples are packed there in accordance with the latest United States standards. The apple law of Kansas specifies the provisions of the United States standards as they were in effect in 1933 and does not make provision for adoption of the latest United States standards.

The special apple laws of Connecticut, Georgia, Massachusetts, Missouri, New York, Vermont, and Virginia authorize the Commissioner of Agriculture to establish official standards for apples, and under this authority all the States have adopted the United States standards as official although Connecticut and Massachusetts have also issued State standards. In 1937 Michigan enacted a special apple-grading law stating outright that the standard grades for apples shall be limited to the latest United States standards. The Rhode Island apple law gives specifications for containers and the marking of same, the authority for promulgating standards is given in a general standardization law. Under this authority State standards have been issued.

In the other important producing States authority for the standardization and grading of apples is derived from general standardization laws the provisions of which also apply to other products.

Under the provisions of the California Fruit, Nut, and Vegetable Standardization Law, requirements for State standards are specified. The laws of Arkansas, Colorado, Idaho, Illinois, Missouri, Oregon, Pennsylvania, Utah, West Virginia, and Wisconsin authorize the establishment of official standards and under this authority State standards have been adopted as official in Colorado, Idaho, Oregon, and Utah. The use of United States standards for apples in lieu of State standards, however, is permissible under the laws or regulations adopted in Colorado, Oregon, and Utah. Arkansas, Illinois, Pennsylvania, West Virginia, and Wisconsin have adopted United States standards as official under their lawful authority.

The general standardization laws of Florida, Indiana, Louisiana, Mississippi, North Dakota, Ohio, and South Dakota state specifically that the standards promulgated for all fruits and vegetables shall be the same as those recommended by the United States Department of Agriculture.

In summarizing the lawful authority granted in the special apple and general standardization laws for the adoption of standards for apples, the laws of the following States specify the requirements or provide authority for adoption of United States grades only: Delaware, Florida, Indiana, Kansas, Louisiana, Michigan, Mississippi, North Dakota, Ohio, and South Dakota. Either Federal or State standards may be adopted under the laws of the following States: Arkansas, California, Colorado, Connecticut, Georgia, Idaho, Illinois, Maine, Maryland, Massachusetts, Missouri, New Hampshire, New York, Oregon, Pennsylvania, Rhode Island, Utah, Vermont, Virginia, Washington, West Virginia, and Wisconsin. Of these States all but California, Colorado, Idaho, New Hampshire, Oregon, Rhode Island, and Washington have officially adopted United States standards, but the laws or regulations of California, Colorado, Idaho, New Hampshire, and Oregon specify that the United States standards for apples may be used in lieu of State



standards, and it is known that the use of Federal grades in some of the remaining States is sanctioned. Under the apple law of Montana, State grades only are official.

#### Compulsory Grading Provisions

Practically all the special and general standardization laws require that apples be graded in accordance with established standards, and most of them require that the grade designation be marked on the containers. Although such laws obviously contain compulsory grading provisions, technically speaking they cannot be classed as such because most of them contain further provisions authorizing the grower or shipper to mark packages not graded in accordance with the requirements of official standards with such terms as "unclassified", "not graded", "grower's grade", "culls", etc.

These designations are not considered grades from the standpoint of the Federal Government, and strictly speaking only those States whose laws or regulations require sorting of the products to meet requirements of official grades without the privilege of selling those apples are below the requirements of the lowest official grade or which are not sorted at all, are regarded as having compulsory grading laws. From this viewpoint California is the only State requiring compulsory grading of apples since the California standards do not make provision for selling or shipping apples below the requirements of the lowest official grade and the law requires that apples offered for sale must meet the requirements of one of the grades.

#### Marking of Containers

Practically all the commercial apple-producing States require certain marking of packages of apples packed for sale or shipment, either through provisions of laws or through regulations promulgated under such laws. All but two of the special apple-grading laws, which include those of Connecticut, Delaware, Kansas, Maine, Maryland, Massachusetts, Michigan, Missouri, Montana, New Hampshire, New York, Rhode Island, Vermont, and Washington specify certain markings to be placed upon apple containers. The special laws of Georgia and Virginia authorize the Commissioner of Agriculture to prescribe the markings that shall be shown on packages of apples offered for sale or shipment. The grade designation is required to be shown on apple packages either by law or regulation in all the above-named States except Connecticut, Georgia, and New Hampshire.

The general standardization laws of California, Colorado, Idaho, Illinois, Indiana, Louisiana, New Jersey, Ohio, and Washington specify certain markings to be placed on packages of fruits and vegetables which would, of course, include apple packages. Under regulations adopted in accordance with provisions of standardization laws certain markings of apple packages are also required in Oregon, Pennsylvania, Utah, West Virginia, and Wisconsin. The grade designation must be shown on packages of apples offered for sale or shipment in all these States listed except New Jersey and Pennsylvania.

Other important markings required to be shown on packages of apples offered for sale or shipment include the name and address or locality of the

grower, person, or firm under whose authority the apples were packed or repacked, the name of the variety, and the net contents either by weight or measure, minimum size, or numerical count. The name and address are required either by law or regulation on apple packages in all the States heretofore listed except Colorado, Georgia, Nevada, and Pennsylvania. The variety name of the apples in the packages must be shown except in Georgia, Indiana, Louisiana, Montana, Ohio, and Pennsylvania. Marking packages as to minimum size, cubical contents, net weight, or numerical count is required in all the States except Georgia and Louisiana.

With further reference to marking of packages the laws of most of the States require markings to be shown only on packages of apples grown and offered for sale or shipment within State boundaries. A few laws, however, are specific in attempting to regulate the marking of packages of apples shipped in from other States. The Idaho law specifies that apples imported into the State must be marked with the name of the variety, place where grown, the name of the grower or his lot number, net contents or count, and the grade. The Indiana law specifies that apples and other fruits and vegetables packed in original containers and graded according to local grades of the State wherein they originated are exempt from other provisions of the standardization law provided the packages are marked with the grade, name, and address of grower or distributor, and the State wherein grown, and providing the grades of such State are the equivalent to or are more rigid than the Federal grades. The provisions of the Ohio law affect grading and marking of apples produced in other States in that the law specifies that all packages of fresh fruits and vegetables offered for sale shall be marked to show the grade in accordance with United States standards. If enforced, this act would mean that all apples from other States packed and marked with State grade designations would have to be remarked before offering them for sale.

The State of Washington regulates shipments of apples and other fruits, vegetables, and horticultural products imported from other States by requiring in their horticultural laws that containers shall be marked to conform with the obligatory standards, rules, and regulations duly promulgated by the proper authority of the State wherein such produce was produced or the standards, rules, and regulations adopted by the United States Department of Agriculture.

Many State laws and regulations are not specific in stating that marking and grading requirements shall apply to apples imported from other States but some States have used this interpretation, particularly the Western States. The laws of California, Oregon, and Utah, require that all packages of apples as well as other fruits and vegetables that are offered for sale or transportation or transported or sold shall be marked to show the grade designation as well as other information. On the strength of such provisions, truck, rail, and boat shipments of apples and other produce imported from other States are subjected to the provisions of the laws in the State of destination.

Many marking requirement provisions of the laws of the eastern apple producing States are worded similarly to the laws of the Western States but as far as is known they have not been interpreted as applying to apples imported from other States.



The laws of California, Vermont, and Washington, and Missouri require that the grade of apples sold to retail shall be shown either by marks on the container or by a suitable placard.

### Inspection of Apples

Practically all the laws governing standardization as applied to apples provide for official inspection in accordance with established standards. Inspection is optional in all States except Washington although in most of the important commercial producing States a large percentage of the carlot shipments are inspected by Federal-State inspectors and a certificate is issued showing the grade and condition of the shipment. According to the provisions of an act passed in 1939 in Washington it is unlawful to ship any apples unless they have been inspected by the Division of Horticulture and a permit obtained by the shipper. In the event any apples are found to be culls they must be reinspected carefully for disease and infestation and if found to be free of infestation a certificate shall be issued so certifying.

### Voluntary versus Compulsory State Standardization Legislation

Up to this point I have tried to summarize as briefly as possible the principal features of the various State standardization laws relating to apples. One of the questions that arises in many discussions of the economic ills of the apple industry is the possibility of improving marketing conditions and returns to growers through compulsory grading and inspection methods. In the first place, I wish to make the position of the Agricultural Marketing Service entirely clear on matters of this kind. It is not the policy of the Service to attempt to dictate to a State government or to an industry the provisions of either permissive or compulsory standardization legislation. The Service, however, will be glad to study and make suggestions regarding such proposals if requested to do so.

With regard to State standardization legislation, it is our opinion that every State in which fruits and vegetables are produced commercially should have either an appropriate standardization law or should vest a designated official with legal authority to establish standards. Any State without such a law is always privileged to use the Federal standards, but standards for some commodities have not been issued as yet by the Department though work is going forward on certain ones. Without legal authority a State would be handicapped in setting up State standards for some commodities or the establishment of additional standards to meet special local or emergency conditions that cannot be met acceptable by the Federal standards.

Whether an industry or a State elects to place its standardization program on a voluntary or compulsory basis is a question which the State or that part of the industry involved must decide for itself. The legal form to work takes is of far less importance than the benefits that are obtained.

Certainly, most growers will agree that it is desirable that their fruit be graded on the basis of uniform standards and that containers be marked to show such information as the grade designation, size, name and address of the packer, net weight, and numerical count. Most will also agree that uniform grading and marking facilitates trading, minimizes disputes between buyer and seller, and helps in settling them, and that a well-graded package usually moves more freely or will sell at a premium compared with carelessly graded and poorly packed fruit. Some in the apple industry propose the enactment of compulsory legal measures to prevent the sale of low-grade apples that interfere with the movement of fruit of better quality.

However desirable these objectives, the fact remains that growers and shippers employ standardization as a means to an end -- the sale of a particular crop of fruit at the best return the markets will yield. It is a cold fact that under some conditions growers may receive higher returns in local markets from sales made orchard-run with culls out than when the fruit is classified into several grades. There are many other situations where growers must grade their fruit carefully in accordance with official standards in order to sell their crops at all. It may well be that the standardization program of the Federal Government and the States has not been recognized as fully as it should, such variations in demand and market outlets in better adapting the standards to the practical marketing conditions faced by growers.

Consequently, one of the first questions to be answered in considering compulsory standardization is whether the grades are generally adaptable to the conditions under which they are to be used and can be equitably applied; and the next is whether the growers and shippers involved have used them sufficiently to accept the grades readily. Our experience indicates that no standardization program can be successful if it is not generally supported. Usually this cannot be accomplished without considerable self education in recognition of its value through practical use. Compulsion alone backed by the soundest legal authorization possible will not achieve this end. If growers find that returns for well-graded fruit are greater than for orchard-run they will support the program irrespective of its legal genesis, but if growers are told to grade and mark their packages in a certain way because it is required by law, they will naturally resent enforcement efforts.

It is desirable that State laws providing for compulsory standardization should be such as to permit the inauguration of the compulsory features when the sentiment of at least a majority of the growers involved favors the action. This may be accomplished through provision in the basic law for the promulgation of regulations needed from time to time. It is desirable that provision be made for public hearings and possibly a referendum or some other means of ascertaining the views of the industry regarding the matter. By handling it in this manner the administrative officer may be guided by majority opinion in the industry, and it is not necessary to amend the basic law to adopt a change in policy. This procedure also provides an element of flexibility that is needed at times in changing the regulations to better adapt them to important changes in production and marketing conditions.



We should not overlook the fact that appropriations for proper enforcement of compulsory standardization legislation and the necessary enforcement personnel and procedure should all be considered carefully when the law is enacted. Without effective enforcement the program will fall of its own weight, and unfortunately may serve as a boomerang against those who support it by creating competitive situations in which violators may reap certain financial advantages to the detriment of those who comply with the law. Therefore, careful study should be given to the practical functioning of such legislation when it is drafted.

Of course, the question whether a State or an industry should adopt compulsory inspection sometimes is highly controversial. Those favoring it argue that it puts all growers and shippers on an equal basis, higher prices are obtained for graded and inspected produce, the inspection certificates are prima facie court documents and a market reputation is developed through selling better graded produce. Those opposing it state that inspection of the entire movement is unnecessary for efficient marketing, the cost is too large, marketing costs are increased out of proportion to the returns, and the property rights of individuals are unduly limited. All of these questions are important and must be answered by those directly concerned before decision is made.

We know, however, that in recent years certain changes have occurred in the marketing of fruits and vegetables that make Federal or Federal-State inspection almost a necessity. The settlement of disputes between buyers and sellers under the Perishable Agricultural Commodities Act is facilitated by official inspection certificates. In almost all the surplus purchasing and diversion programs of the Agricultural Adjustment Administration and the Federal Surplus Commodities Corporation, and in the operation of the Export Apple and Pear Act, official certification of the commodities involved is necessary in ascertaining whether the minimum requirements of these activities have been met. The marketing agreement programs that elect to operate under grade and size shipping regulations, also require inspection in the administration of the regulations. None of these requirements need concern State laws directly, however, as they are covered by the requirements set forth in the Federal programs.

I wish to emphasize, however, that at present none of the States except Washington or the Federal Government have provided for compulsory inspection of apple shipments in their standardization laws. Whether this should be done is a matter for determination within the industry, after careful study of the advantages, disadvantages, and the problems of operation and enforcement. In any consideration of the matter, it seems to us that the national view of standardization that has developed in the apple industry should be appreciated fully. Certainly, recognition must be given to the national and international aspects of apple marketing, as well as to State and local problems in conducting standardization work. We feel that the Agricultural Marketing Service is making a real contribution to the work by serving as the national agency in developing and interpreting the Federal standards in order to unify the grades used in domestic and foreign markets. Doubtless much more remains to be done. The immensity of the apple marketing problem requires the close working together of the State and Federal Governments with the industry if effective solutions are to be found.



